

Postdoc position on flux measurements and remote sensing at the Thünen Institute of Climate-Smart Agriculture (TI-AK)

The Thünen-Institute of Climate-Smart-Agriculture (TI-AK) is looking for a postdoc scientist particularly for measurements of greenhouses gas fluxes and for humus balances in agricultural ecosystems. The successful candidate will be involved in several ongoing projects including measurement and modeling of greenhouse gas fluxes and developing new methods. Novel approaches are of micrometeorological measurement of N₂O with Eddy-Covariance und continuous measurements of leaf properties such as the chlorophyll content and fluorescence to bridge on-site GHG measurements to remote sensing. Data will also be used for the evaluation of GHG emissions and the development of reduction options in Oil Seed Rape cultivation for biodiesel.

Job description/ methods:

- Scientific responsibility for the flux sites Gebesee (Thuringia) and Dedelow (Brandenburg),
- Integration of continuous chlorophyll fluorescence measurements into the established flux site Gebesee,
- Integration of N₂O measurement by eddy covariance and of automated soil respiration measurements into the established flux site Dedelow,
- Data analysis and integration to total C-budgets and greenhouse gas balances under consideration of models and data from other sites (e.g. from Fluxnet),
- Further development of evaluation procedures for agricultural products particularly with regard to bio-energy products (ecobalance, Life Cycle Analyses) in cooperation with project partners.

Requirements:

- Applicants should have a background and hold a PhD in the field of agricultural sciences, environmental sciences, soil sciences, geo-ecology, geography, biology or related disciplines,
- We expect scientific knowledge about transformation and exchange processes of N- und C compounds in soil, plants and atmosphere, about greenhouse gas emission from agricultural crop production, and basic knowledge of pedological processes and related measuring technology,
- Previous work experience should include field measurements and knowledge of eddy covariance technique; further technical skills are acknowledged,
- Good programming skills and experience in processing large data sets (R, MATLAB etc.) are expected,

- Applicants should be interested scientific problems and highly motivated to work collaboratively as a member of an interdisciplinary research team,
- They should have excellent scientific writing skills and be fluent in English.

The position shall ideally start January 1st 2014 and is limited to 2 years. The payment will be according to the German pay scale TVöD 13.

The Thünen Institute supports gender equality at work and encourages female candidates to apply for this position. Handicapped applicants are specially considered if equally qualified for the job, a minimum of physical fitness is required.

Inquiries about the position to Wemer Kutsch (wemer.kutsch@ti.bund.de, Tel.: +49 531 596 2569) or Christian Brümmer (christian.bruemmer@ti.bund.de, Tel.: +49 531 596 2614).

You are welcome to send your applications with the usual documents (CV, Cover letter, publication list, certificates) including the keyword "EO-LDAS/RAPS" (preferably by email) to:

Thünen Institute of Climate-Smart Agriculture
Bundesallee 50, D-38116 Braunschweig
E-Mail: ak@ti.bund.de

Applications received by November 18th 2013 will receive full consideration. The German version of this job offer, published under Ref No 13-183-AK at the website of the Thünen Institute is valid. (http://literatur.vti.bund.de/stellenmarkt/13-183-AK_0.pdf)